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REPORTS, CONCLUSIONS AND RECOMMENDATIONS OF SUBSIDIARY BODIES: ECONOMIC QUESTIONS AND ENVIRONMENTAL QUESTIONS

# Transport of dangerous goods

## Work of the Committee of Experts on the Transport of Dangerous Goods

## Report of the Secretary-General

SUMMARY

In accordance with Economic and Social Council resolution 645 G (XXIII), the Secretary-General reports biennially to the Council on the work of the Committee of Experts on the Transport of Dangerous Goods. In the present report, the Secretary-General brings to the attention of the Council the work done by the Committee and its subsidiary body during the biennium 1995-1996, pursuant to Council resolutions 1995/5 and 1995/6 and decision 1996/301.

The Committee adopted new and amended recommendations on the transport of dangerous goods and reviewed its recommendations on the transport of dangerous goods in multimodal portable tanks. The Committee also reformatted the ninth revised edition of Recommendations on the Transport of Dangerous Goods into a model regulation, annexed to a basic recommendation.

In order to give effective follow-up to chapter 19 of Agenda 21, on the environmentally sound management of toxic chemicals, the Committee formed joint working groups with the International Labour Organization in order to develop harmonized criteria for the classification of chemicals presenting

* E/1997/100, to be issued.

physical hazards. It also cooperated with other organizations concerned for the development of harmonized classification criteria for chemicals presenting health hazards or hazards to the environment.

The Committee considered that, on the basis of its work in the biennium 1995-1996, the tenth revised edition of the Recommendations should be published in all the official languages of the United Nations not later than the end of 1997. However it agreed not to recommend any date for the implementation of the recommendations. It also decided that, on the basis of its work in the biennium 1997-1998, a revised version should be published in 1999, and recommended that all provisions therein should be implemented by 1 January 2001. The Committee decided not to take a position at the current time on future policy regarding the cycle of amendments after 2001.

The Committee included in its work programme for 1997-1998 step two in the reformatting of the Recommendations into a model regulation, matters related to explosive substances and articles, and the global harmonization of systems of classification and labelling.

The Committee is recommending a draft resolution on its work for adoption by the Council.

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## I. DRAFT RESOLUTION FOR ADOPTION BY THE COUNCIL

1. The Committee of Experts on the Transport of Dangerous Goods recommends to the Economic and Social Council the adoption of the following draft resolution:

### DRAFT RESOLUTION

### Work of the Committee of Experts on the Transport of Dangerous Goods

The Economic and Social Council,

Recalling its resolutions 1995/5 and 1995/6 of 19 July 1995,

Recalling also its decision 1996/301 of 26 July 1996 by which it invited the Committee, when examining the question of periodicity of amendments to the Recommendations on the Transport of Dangerous Goods, to take fully into account the views expressed by delegations during the substantive session of 1996 of the Council,

Bearing in mind the increasing volume of dangerous goods in worldwide commerce and the rapid expansion of technology and innovation,

Bearing also in mind the continuing need to meet the growing concern for the protection of life, property and the environment through the safe transport of dangerous goods, while facilitating trade,

Aware that, in order to achieve internationally harmonized laws, the Economic Commission for Europe, the International Maritime Organization, the International Civil Aviation Organization and other specialized agencies and international organizations involved in activities related to the transport of dangerous goods and interested Member States have responded positively to the Council's various resolutions adopted since 15 April 1953, and that, being committed to taking the recommendations of the Committee of Experts on the Transport of Dangerous Goods as a basis for the formulation of their requirements and regulations, including those concerning labelling and classification, those organizations therefore rely on the work of the Committee,

Aware also of the advice of the Committee to the effect that reformatting the provisions applicable to all modes of transport contained in the Recommendations on the Transport of Dangerous Goods[1] into a model regulation, annexed to a basic recommendation, which could be directly integrated into all modal national and international regulations would enhance harmonization, facilitate regular updating of all instruments concerned by the relevant organizations or regulatory authorities, and result in considerable overall

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[1] United Nations publication, Sales No. E.95.VIII.1.

savings for the Governments of the Member States, the United Nations, the specialized agencies and other international organizations,

Reconfirming the need for the Committee to participate actively in relevant activities associated in the implementation of Agenda 21,[2] as expressed in its resolution 1995/6,

A. Work of the Committee of Experts during the biennium 1995-1996

1. Takes note of the report of the Secretary-General on the work of the Committee of Experts on the Transport of Dangerous Goods during the biennium 1995-1996,[3] and in particular of:

(a) The adoption of new and amended provisions[4] for inclusion in the Recommendations on the Transport of Dangerous Goods;[1]

(b) The completion of the first step in the reformatting of the existing Recommendations into a model regulation annexed to a basic recommendation;[5]

(c) The elaboration, pursuant to resolution 1995/6, of propcsals for criteria for the classification of flammable, explosive and reactive materials, globally harmonized for various regulatory purposes, in cooperation with the International Labour Organization in the context of the implementation of chapter 19 of Agenda 21; and the concurrence of the Committee with the request from the International Labour Organization for pursuing the work in 1997-1998 for unresolved issues on the same basis as in 1995-1996;

2. Commends the Secretary-General for the timely publication of the ninth revised edition of the Recommendations on the Transport of Dangerous Goods in all the official languages of the United Nations and for the publication of the second revised edition of the Manual of Tests and Criteria in English, French, Spanish and Russian;[6]

3. Requests the Secretary-General:

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[2] Report of the United Nations Conference on Environment and Development, Rio de Janeiro, 3-14 June 1992 (A/CONF.151/26/Rev.1 (Vol. I and Vol. I/Corr.1, Vol. II, Vol. III and Vol. III/Corr.1)) (United Nations publication, Sales No. E.93.I.8 and corrigenda), vol. I: Resolutions Adopted by the Conference, resolution 1, annex II.

[3] E/1997/16.

[4] See ST/SG/AC.10/23/Add.1.

[5] ST/SG/AC.10/23/Add.2.

[6] United Nations publication, Sales No. E.95.VIII.2.

(a) To circulate the new and amended recommendations to the Governments of Member States, the specialized agencies, the International Atomic Energy Agency and other international organizations concerned;

(b) To publish a consolidated version of the Recommendations, as amended,[7] in the reformatted form of a model regulation, annexed to a basic recommendation, including the new and amended recommended provisions, in all the official languages of the United Nations, in the most cost-effective manner, not later than the end of 1997;

(c) To expedite the publication, in the most cost-effective manner, of the second revised edition of the Manual of Tests and Criteria in Arabic and Chinese;

4. Invites all Governments, the specialized agencies, the International Atomic Energy Agency and the other international organizations concerned to transmit to the Secretary-General their views on the Committee's work, together with any comments that they may wish to make on the amended recommendations;

5. Invites all interested Governments, regional commissions and specialized agencies and the international organizations concerned, when developing or updating appropriate codes and regulations, to take full account of the recommendations, including the structure and format of such codes and regulations;

## B. Programme of work for the biennium 1997-1998

6. Approves the programme of work of the Committee and its Subcommittee for the biennium 1997-1998 and the working arrangements and the priorities of work for that biennium, as follows:

(a) Global harmonization of systems of classification and labelling of chemicals (implementation of chapter 19 of Agenda 21), in accordance with Council resolution 1995/6;

(b) Second step in the reformatting of the Recommendations on the Transport of Dangerous Goods into a model regulation;

(c) New or revised recommendations on the transport of dangerous goods;

7. Requests the Secretary-General to take all necessary steps for ensuring secretariat representation of the Committee at appropriate meetings of international organizations committed to implementing the recommendations of the Committee or involved in the process of global harmonization of classification and labelling systems for chemicals;

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[7] ST/SG/AC.10/1/Rev.10.

C. Periodicity of amendments to the Recommendations

8. Takes note of the advice of the Committee that:

(a) A new and revised version of the Recommendations should be published after completion of the second step of reformatting - that is, in 1999, after the 1998 session of the Committee;

(b) The new and revised version should be implemented by the various international organizations concerned with the transport of dangerous goods through their respective modal instruments by 1 January 2001;

(c) No firm decision as regards a possible future four-year periodicity of amendments should be taken as long as the processes of reformatting the Recommendations into a model regulation, annexed to a basic recommendation, and of global harmonization of systems of classification and labelling of chemicals for the implementation of Agenda 21 have not been completed;

9. Invites the Committee to reconsider the issue at its 1998 session;

D. Report to the Council

10. Requests the Secretary-General to submit a report to the Council in 1999 on the implementation of the present resolution.

II. WORK OF THE COMMITTEE DURING THE BIENNIUM 1995-1996

A. Meetings held

2. After the substantive session of the Economic and Social Council in 1995, the following meetings were held:

(a) Subcommittee of Experts on the Transport of Dangerous Goods: tenth session, 10-20 July 1995 (ST/SG/AC.10/C.3/20, Corr.1 and Add.1); eleventh session, 4-15 December 1995 (ST/SG/AC.10/C.3/22 and Add.1-2); twelfth session, 1-12 July 1996 (ST/SG/AC.10/C.3/24 and Add.1-3);

(b) Committee of Experts on the Transport of Dangerous Goods: nineteenth session, 2-10 December 1996 (ST/SG/AC.10/23 and Add.1-4).

3. The following 21 countries participated in the work of the Committee and of its Subcommittee as full members:[8] Argentina; Australia; Belgium; Brazil; Canada; China; France; Germany; India; Italy; Japan; Mexico; Morocco; Netherlands; Norway; Poland; Russian Federation; Spain, Sweden; United Kingdom of Great Britain and Northern Ireland; and United States of America. The Governments of Austria, Czech Republic, Finland, Islamic Republic of Iran,

[8] Australia and Spain became full members of the Committee pursuant to Economic and Social Council decision 1996/3__ of 22 November 1996.

New Zealand, Nigeria, Panama, Portugal, Slovakia, South Africa, Switzerland, Tunisia and Ukraine were represented by observers. The Commission of the European Communities and 26 specialized agencies and intergovernmental and non-governmental organizations also participated.

4. Liaison was maintained with the international bodies or organizations responsible for individual modes of transport, in particular, the Economic Commission for Europe (ECE) (for inland transport in the ECE region), the International Civil Aviation Organization (ICAO), the International Maritime Organization (IMO) and the Central Office for International Carriage by Rail.

5. The Committee paid special attention to the coordination of its own activities with those of other international organizations whose activities impinge on the field of transport of dangerous goods, such as the International Labour Organization (ILO), the World Health Organization (WHO) and the United Nations Environment Programme (UNEP), to ensure that their work would complement, rather than duplicate or clash with, existing agreements and instruments on the safe transport of dangerous goods.

## B. Work of the Subcommittee of Experts on the Transport of Dangerous Goods

6. During the biennium 1995-1996, the Subcommittee discussed, as usual, various miscellaneous questions related to its terms of reference but gave priority, in accordance with Council resolution 1995/5, to:

(a) Global harmonization of classification criteria (implementation of chapter 19 of Agenda 21) (see sect. C below);

(b) Reformatting of the Recommendations on the Transport of Dangerous Goods into a model regulation, annexed to a basic recommendation;

(c) Review of the recommendations on the transport of dangerous goods in multimodal portable tanks.

7. A complete revised set of recommended provisions concerning the design, construction, inspection, testing and approval of portable tanks (tank-containers) intended for the transport of liquid and solid dangerous substances, non-refrigerated liquefied gases, and refrigerated liquefied gases was elaborated. That work was done with due regard to the existing and foreseeable future development of multimodal international transport using containerization techniques and the fact that, in the course of international transport, a portable tank may be subjected to different climatic conditions and different types of stresses owing to the successive types of means of transport used for carrying it. The Committee adopted the provisions prepared by the Subcommittee, subject to further refinement of provisions concerning gases in the biennium 1997-1998.

8. The Recommendations were rearranged in the form of a model regulation, annexed to a basic recommendation. In a second step, during the biennium 1997-1998, it will be necessary to supplement the new version with a number of

new provisions, such as detailed packing instructions for individual substances and other provisions normally found in instruments regulating the transport of dangerous goods by one given mode, so that the model regulation can be directly integrated into national or international instruments, without substantial redrafting.

## C. Follow-up to the United Nations Conference on Environment and Development

9. In accordance with General Assembly resolutions 47/190 and 47/191 and Council resolution 1995/6, the Committee continued to give effective follow-up to Agenda 21, in particular to chapter 19, on the environmentally sound management of toxic chemicals.

10. In accordance with the recommendations of chapter 19, the Committee cooperated with other organizations concerned with chemical safety, in particular those participating in the Interorganizational Programme for the Sound Management of Chemicals (IOMC), the United Nations Environment Programme (UNEP), the International Labour Organization (ILO), the Food and Agriculture Organization of the United Nations (FAO), the World Health Organization (WHO), the United Nations Industrial Development Organization (UNIDO), the Organization for Economic Cooperation and Development (OECD) and the Intergovernmental Forum on Chemical Safety. The main area of cooperation was the development of a globally harmonized system of classification and labelling of dangerous products.

11. In accordance with Council resolution 1995/6, joint working groups of experts in the classification of chemicals presenting physical hazards (flammability and reactivity) were convened in consultation with ILO during each session of the Subcommittee. The working groups developed proposals for globally harmonized classification criteria on the basis of existing internationally recognized classification regimes for flammable liquids, flammable solids and flammable gases, explosives and desensitized explosives, organic peroxides, oxidising substances, pyrophoric substances, self-reactive substances, and substances reacting with water giving off flammable gases, and those proposals were adopted by the Committee. The report on the work of the working groups[9] was presented by the IOMC secretariat, together with a progress report from OECD on harmonized classification criteria for health hazards, to the Intergovernmental Forum on Chemical Safety at its second session (Ottawa, 10-14 February 1997), where ways and means to implement the global harmonized system were discussed.

12. The working groups of experts could not complete the work they had been assigned; no final conclusion could be reached in certain cases. Therefore on a proposal by ILO, the Committee agreed that joint meetings of experts should be convened again in 1997 during the sessions of the Subcommittee, to resolve outstanding issues and complete the harmonization proposals.

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[9] ST/SG/AC.10/23/Add.4.

13. The Committee cooperated with OECD to ensure that the criteria developed by that organization, designated by IOMC as the focal point for health hazards and hazards to the environment, were suitable for transport regulation purposes. Further work would be needed in that area in 1997.

### D. Publication of the Recommendations on the Transport of Dangerous Goods and future periodicity of amendments

14. As requested by the Council in resolution 1995/5, the Secretary-General prepared the ninth revised edition of the Recommendations on the Transport of Dangerous Goods[4] on the basis of the recommendations adopted by the Committee at its eighteenth session.[10] The edition was published for official circulation and sale in Arabic (260 copies), Chinese (105 copies), English (7,710 copies), French (1,495 copies), Russian (180 copies) and Spanish (575 copies). It is also available on electronic support (diskettes).

15. The secretariat also published the second revised edition of the Manual of Tests and Criteria,[6] in English (3,810 copies), French (1,040 copies), Spanish (470 copies) and Russian (180 copies). The Committee requested that the Arabic and Chinese versions, which were still in preparation but should be available for the Council at its substantive session in 1997, be published expeditiously.

16. The Committee requested the secretariat to prepare the tenth revised edition of the Recommendations on the basis of its work in the biennium 1995-1996 and the texts adopted at its nineteenth session and to publish it in the form of a model regulation, annexed to a basic recommendation, in the most effective manner, without delay, in all official languages of the United Nations and not later than the end of 1997.

17. The question of periodicity of amendments to the Recommendations was raised by the Secretary-General of IMO in a letter addressed to the Secretary-General of the United Nations which was brought to the attention of the Council at its substantive session in 1996,[11] where it was proposed that the publication cycle be expanded from every two years to every four years. In its decision 1996/301, the Council, noting that the Committee would examine the question at its nineteenth session, invited the Committee to take fully into account the views expressed by delegations at the substantive session of the Council in 1996.

18. The Committee decided not to recommend any precise date for the implementation of the provisions contained in the tenth revised version of the Recommendations. It also decided that an eleventh edition should be published in 1999, on the basis of its work in the biennium 1997-1998, but recommended that all provisions contained therein should be implemented by 1 January 2001. The Committee decided not to take a position at the current time on future policy regarding the cycle of amendments after 2001, since several experts thought it preferable to reconsider the question in 1998 in the light of the

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[10] ST/SG/AC.10/21 and Add.1-3.

[11] E/1996/15.

progress made in the global harmonization of systems of classification and labelling of chemicals and in the process of restructuring the various modal instruments concerned on the basis of the model regulations.

## E. Resources

19. As requested in Council resolution 1995/5, appropriate staff resources were maintained for the servicing of meetings related to the work of the Committee and its Subcommittee. The secretariat functions are performed by the secretariat of the Economic Commission for Europe.

20. Bearing in mind the role of the secretariat in the implementation of the Recommendations, through cooperation with the secretariats of those international organizations to which the Recommendations are directed and those cooperating in the process of global harmonization of classification and labelling systems, the Committee recommended, in its draft resolution, that the Council request the Secretary-General to take all necessary steps for ensuring secretariat representation of the Committee at appropriate meetings of those international organizations.

## F. Future work

21. The Committee agreed that the programme of work for the biennium 1997-1998 should be as follows:

(a) Global harmonization of systems of classification and labelling of chemicals;

(b) Reformatting of the Recommendations on the Transport of Dangerous Goods (second step):

(i) Revision of the first version of the model regulation annexed to the tenth revised edition of the Recommendations - in particular as regards portable tanks for gases, a rationalized approach for assigning portable tank requirements, and additional marking of tanks;

(ii) Development of additional requirements - in particular, segregation requirements, consignment procedures, packing instructions, introduction of class-7 provisions;

(c) New or revised recommendations on the transport of dangerous goods, including:

(i) Consideration of miscellaneous new proposals concerning subjects approved by the Committee (definitions and criteria for the tightness of packagings and intermediate bulk containers (IBCs); reuse, reconditioning and remanufacturing of IBCs; packing of articles; substances toxic by inhalation; possible classification of

desensitized explosives as flammable liquids; large packagings; aerosol dispensers; listing and classification of new dangerous goods);

(ii) Matters related to explosive substances and articles; Test 6(c); United Nations pressure vessel test.

## G. Calendar of meetings for the biennium 1997-1998

22. The Committee proposed that its twentieth session be held from 7 to 16 December 1998. The Subcommittee of Experts should meet three times: from 7 to 17 July 1996, from 8 to 19 December 1997, and from 29 June to 10 July 1998.

## H. Draft resolution on the work of the Committee

23. The Committee approved a draft resolution (see sect. I) entitled "Work of the Committee of Experts on the Transport of Dangerous Goods" for recommendation for adoption by the Economic and Social Council.

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